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## Human adaptation to diverse biomes over the past 3 million years

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We identify past human habitat preferences over time to investigate the role of vegetation and ecosystem diversity on hominin adaptation and migration. Using a transient 3-million-year earth system-biome model simulation and an extensive hominin fossil and archaeological database we distinguish in what habitat previous Hominin lived. Our analysis shows that early African hominins predominantly lived in open environments such as grassland and dry shrubland. Hominins adapted to a broader range of biomes by migrating into Eurasia. By linking the location and age of hominin sites with corresponding simulated regional biomes, we also find a preference for spatially diverse environments. Suggesting our ancestors actively sought out mosaic landscapes.